Technics

Stereo Integrated Amplifier

SU-G50

OPERATING INSTRUCTIONS

PX

Before operating this unit, please read these instructions completely.

Dear Stereo Fan

We want to thank you for selecting this product and to welcome you to the growing family of satisfied Technics product owners around the world.
We feel certain you will get maximum enjoyment from this new addition to your home.
Please read these operating instructions carefully, and be sure to keep them handy for convenient reference.

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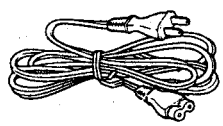
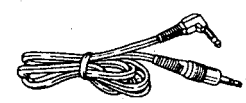
Accessories

- AC power supply cord (Refer to page 6.) 1



- L-type cable (Refer to page 4.) 1



Technical Specifications (IHF '78)

■ AMPLIFIER SECTION

Rated minimum sine wave RMS power output 20 Hz~20 kHz both channels driven 0.05% total harmonic distortion
100W per channel (8 ohms)

1 kHz continuous power output both channels driven 0.05% total harmonic distortion
105W per channel (8 ohms)

Dynamic headroom 1.1 dB (8 ohms)

Total harmonic distortion
half power at 1 kHz 0.03% 8 ohms)

Intermodulation distortion
rated power at 60 Hz: 7 kHz=4:1, SMPTE, 8Ω 0.05%

Frequency response
PHONO RIAA standard curve ±0.8 dB
TUNER, CD, TAPE, VCR 2/TV, VCR 1/EQ
10 Hz~80 kHz, +0, −3 dB

Input sensitivity
PHONO 0.4 mV (2.5 mV, IHF '66)
TUNER, CD, TAPE, VCR 2/TV, VCR 1/EQ
15 mV (150 mV, IHF '66)

S/N (IHF, A)
PHONO 71 dB (73 dB, IHF '66)
TUNER, CD, TAPE, VCR 2/TV, VCR 1/EQ
75 dB (94 dB, IHF '66)

Maximum input voltage (1 kHz, RMS)
PHONO 128 mV (135mV, IHF '66)

Input impedance
PHONO 47 kilohms
TUNER, CD, TAPE, VCR 2/TV, VCR 1/EQ
47 kilohms

Tone controls
BASS 50 Hz, +10 dB~−10 dB
TREBLE 20 kHz, +10 dB~−10 dB
SUPER BASS 80 Hz, +6 dB
Muting −20 dB
Output voltage TAPE REC OUT 150 mV
Load impedance
A or B 8~16 ohms
A and B 8~16 ohms

■ GENERAL

Power consumption 510W
Power supply
AC 50 Hz/60 Hz, 110V/127V/220V/240V
Dimensions (W × H × D) 430 × 130.5 × 310 mm
(16-15/16" × 5-1/8" × 12-7/32")
Weight 7.6 kg (16.7 lb)

Note:
Total harmonic distortion is measured by the digital spectrum analyzer.

Suggestions for Safety

■Use a standard AC wall outlet

1. **Use from an AC power source of high voltage, such as for an air conditioner, is very dangerous.**
   There is the possibility that a fire might be caused by making such a connection.
2. **A DC power source cannot be used.**
   Be sure to check the power source carefully, especially on a ship or other place where DC is used.

■Grasp the plug when disconnecting the power supply cord

1. **Wet hands are dangerous.**
   A dangerous electric shock may result if the plug is touched by wet hands.
2. **Never place heavy items on top of the power supply cord, and never force it to bend sharply.**

■AC outlets on rear panel (not equipped for some countries)

1. **Any equipment connected here should have the specified power consumption or less.**
   These outlets are exclusively for the connection of other audio equipment, such as a tape deck. Be sure the power consumption does not exceed the wattage specified near the AC outlet.
2. **Never connect other electrical appliances, such as an iron or toaster.**
   If appliances with a large power consumption are connected, an accident might occur as a result of overheating.

■Place the unit where it will be well ventilated

Place this unit at least 10 cm (4") away from wall surfaces, etc. Be careful that curtains and similar materials do not obstruct the ventilation holes.

■Avoid places such as the following:

In direct sunlight or in other places where the temperature is high.
In places where there is excessive vibration or humidity.
Such conditions might damage the cabinet and/or other component parts and thereby shorten the unit's service life.

■Be sure to place the unit on a flat, level surface.

If the surface is inclined, a malfunction may result.

■Never attempt to repair or reconstruct this unit

A serious electric shock might occur if this unit is repaired, disassembled or reconstructed by unauthorized persons, or if the internal parts are accidentally touched.

■Take particular care if children are present

Never permit children to put anything, especially metal, inside this unit. A serious electric shock or malfunction could occur if articles such as coins, needles, screwdrivers, etc. are inserted through the ventilation holes, etc. of this unit.

■If water is spilled on the unit

Be extremely careful if water is spilled on the unit, because a fire or serious electric shock might occur. Immediately disconnect the power cord plug, and consult with your dealer.

■Avoid spray-type insecticides

Insecticides might cause cracks or "cloudiness" in the cabinet and plastic parts of this unit. The gas used in such sprays might, moreover, be ignited suddenly.

■Never use alcohol or paint thinner

These and similar chemicals should never be used, because they might cause flaking or cloudiness of the cabinet finish.

■Disconnect the power supply cord if the unit will not be used for a long time

If the unit is left for a long time with the power ON, this will not only shorten its useful operation life, but may also cause other troubles.

■If trouble occurs

If, during operation, the sound is interrupted or indicators no longer illuminate, or if abnormal odor or smoke is detected, immediately disconnect the power cord plug, and contact your dealer or an Authorized Service Center.

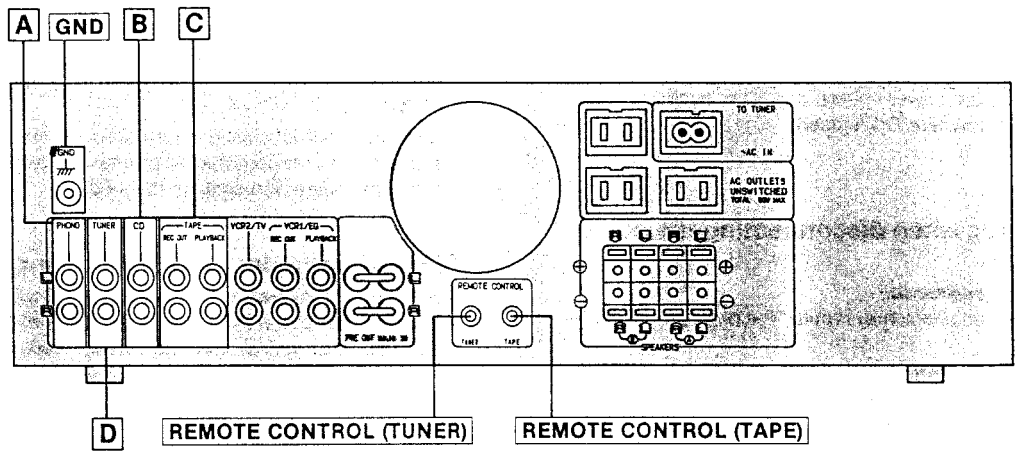
Before Use

Be sure to disconnect the mains cord before adjusting the voltage selector.
Use a minus (−) screwdriver to set the voltage selector (on the rear panel) to the voltage setting for the area in which the unit will be used.

(If the power supply in your area is 117 V or 120 V, set to the "127 V" position.)
Note that this unit will be seriously damaged if this setting is not made correctly. (There is no voltage selector for some countries; the correct voltage is already set.)

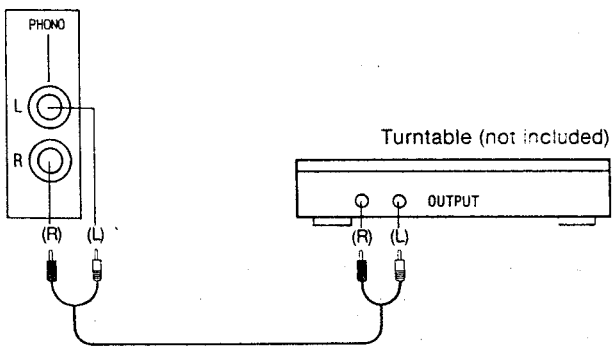
Connections

Make connections to each component in the system by using stereo connection cables (not included).



A "PHONO" terminals

Connect a turntable.

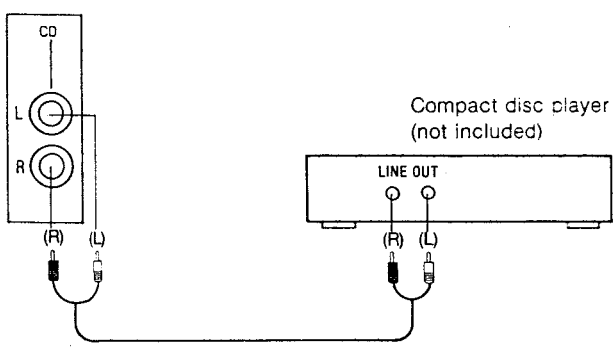


■ GND terminal

This terminal is for use with a turntable which has a ground wire.

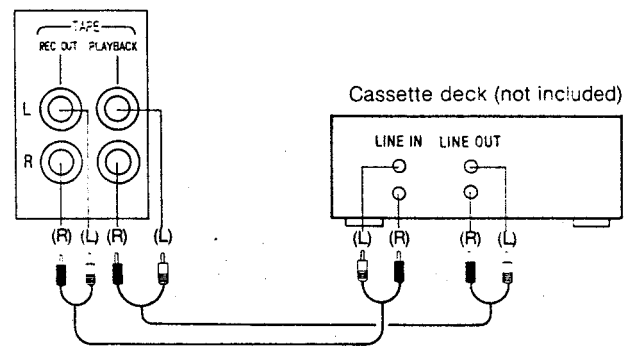
B "CD" terminals

Connect a compact disc player.



C "TAPE" terminals

Connect a tape deck.

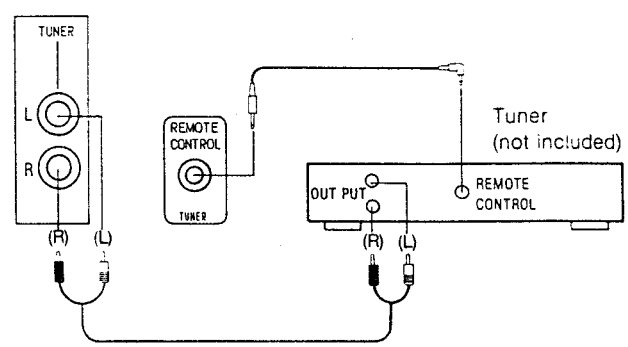


■ REMOTE CONTROL (TAPE) terminal

This terminal is used to connect a Technics tape deck with the control terminal.

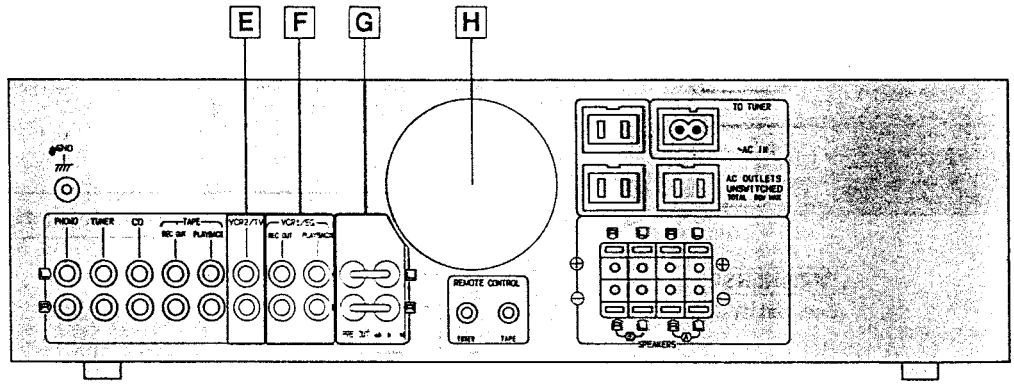
D "TUNER" terminals

Connect a tuner.



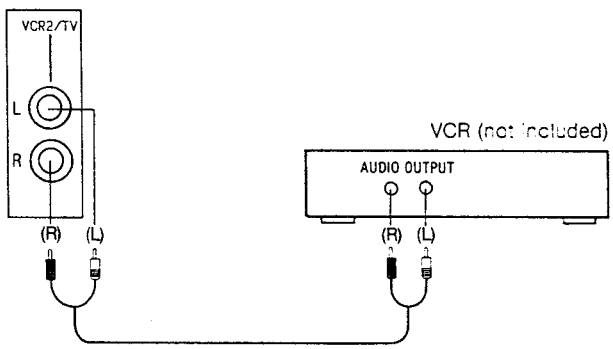
■ REMOTE CONTROL (TUNER) terminal

This terminal is used to connect a Technics tuner with the control terminal. Connect the L-type cable (included).



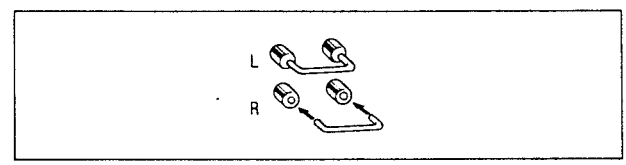
E "VCR 2/TV" terminals

Connect a second video cassette recorder or TV.



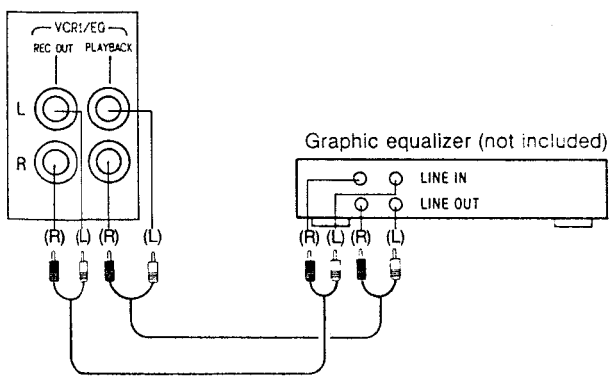
G "PRE OUT/MAIN IN" terminals

Do not remove the shorting pins from these terminals unless you plan to use an independent preamplifier or main amplifier. (No sound will be heard if they are removed). To use it in this way, consult the operating instructions for the additional amplifier or preamplifier that you plan to use.



F "VCR 1/EQ" terminals

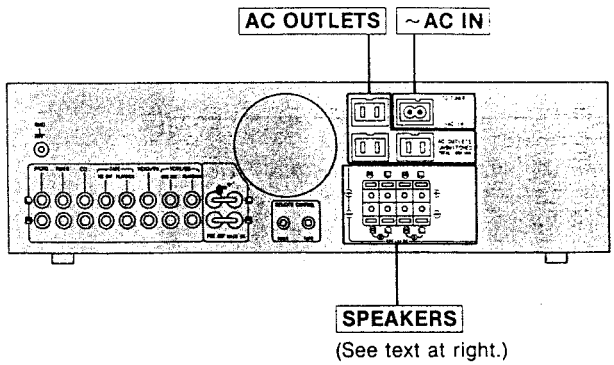
Connect a video cassette recorder or a graphic equalizer.



H Cooling fan

The cooling fan operates at high output power levels only.

Connections (continued)



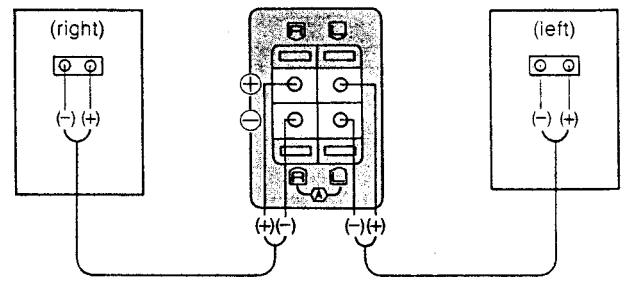
(See text at right.)

Connection to speaker systems

Two pairs of speaker systems (main, second) can be connected to this unit.
Speaker systems that can be connected (to any of the speaker connection terminals of this unit) are speaker systems with an impedance of 8 to 16 ohms.

Main speaker systems (not included)

Connect to the "A" terminals.

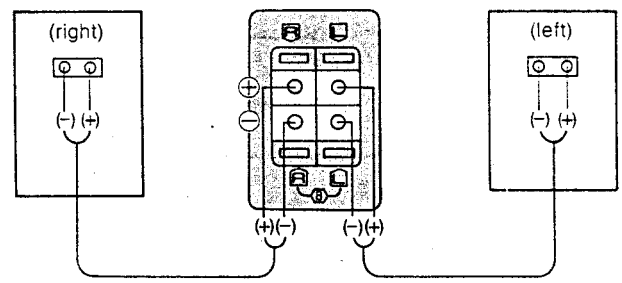


"AC OUTLETS" (UNSWITCHED)

Power is always available, regardless of power switch.
Audio equipment rated up to 60 W (total for all outlets) can be connected here.

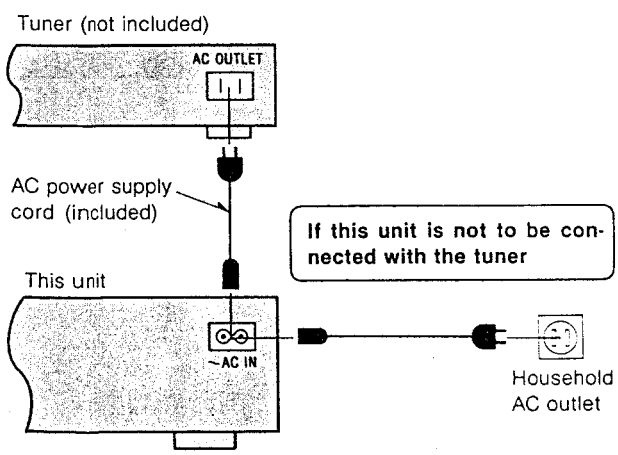
Second speaker systems (not included)

Connect to the "B" terminals.



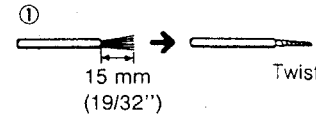
AC power supply cord

Connect the AC power supply cord (included) after all other cables and cords are connected.


Tuner (not included)
AC OUTLET
AC power supply cord (included)
If this unit is not to be connected with the tuner
This unit
~AC IN
Household AC outlet

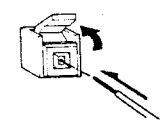
To connect cords to terminals

① Strip off the outer covering, and twist the center conductor.



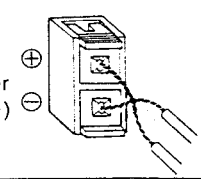
② Tilt the lever back and insert the cord.

③ Close the lever and pull the cord gently to be sure that it is secure.

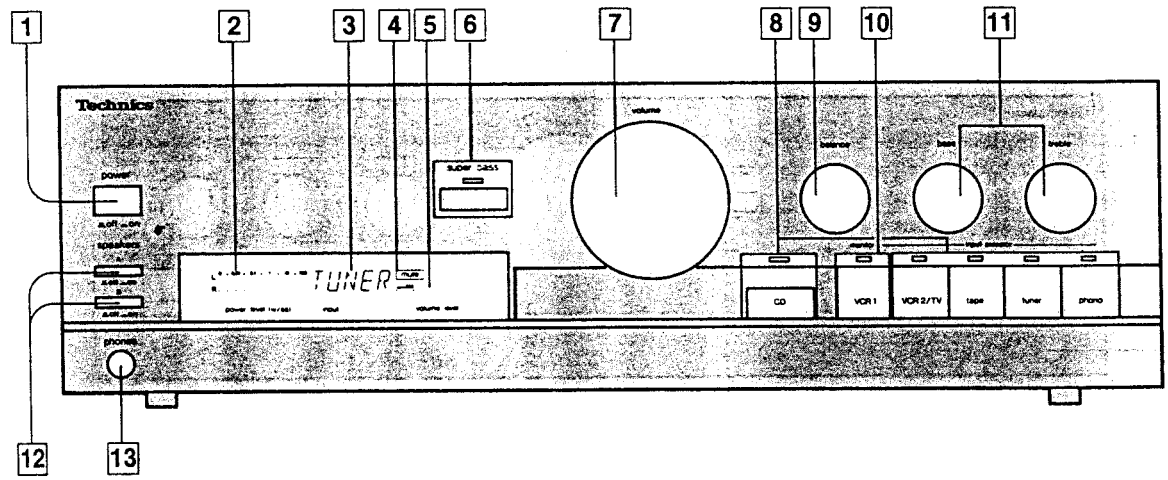


Note:
Be sure to only connect positive (+) cords to positive (+) terminals, and negative (–) cords to negative (–) terminals.

Note:
To prevent damage to circuitry, never short-circuit the plus (+) and minus (–) speaker cords.



Front Panel Controls and Functions



1 Power switch (power)

2 Peak-power indicators (power level)
These indicators indicate the peak power value of the output level to the speaker systems.

3 Input selector/volume level display (input)
This display usually shows the sound source selected by the input selectors; when the volume-control is used to adjust the volume level, the level is displayed in decibel for about two seconds, after which the display returns again to indication of the sound source.

4 Muting indicator (mute)
This indicator will illuminate when the muting button on the remote-control transmitter (not included) is pressed. (Refer to the operating instructions of the component with which the remote-control unit is included.)
To cancel the muting function without using the remote-control transmitter, press and hold the "phono" input selector of this unit for about 4 seconds.
Note:
The unit will switch to the phono mode.

5 Volume indicator (volume level)
Indicates the volume output level at a glance.

6 Super bass switch/indicator (super bass)
Low frequency sounds are reinforced when this switch is pressed.
The indicator will illuminate.

7 Volume control (volume)

8 Input selectors/indicators (input selector)
These selectors are used to select the sound source to be heard, such as a disc, radio broadcasts, etc. The corresponding input selector indicator illuminates during operation to indicate the selected sound source.
The selected sound source is also displayed on the input selector/volume level display.

9 Balance control (balance)
This control is used to adjust the left/right volume balance.

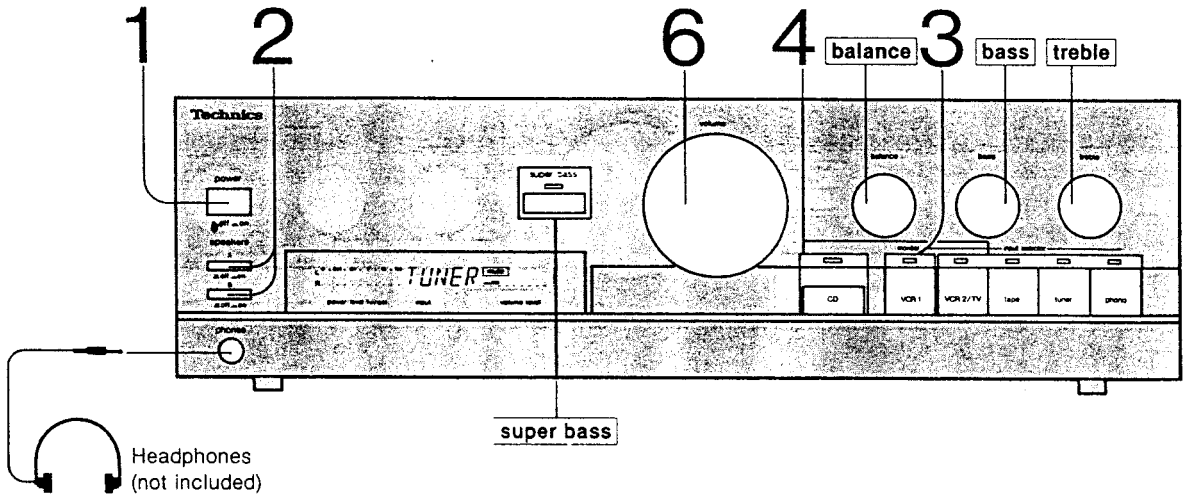
10 VCR 1-monitor switch/indicator (monitor)
Set this switch to the ON position (so that the indicator above is illuminated) when using a graphic equalizer or, playing back or monitoring the sound from a VCR connected to the "VCR 1/EQ" terminals. This selector should be set to the OFF position (indicator off) at all other times.

11 Tone controls (bass/treble)
The bass control is used to adjust the low-frequency sound range, and the treble control is used to adjust the high-frequency sound range.

12 Speaker selectors (speakers)
These selectors are used to turn the speaker systems on and off.

13 Headphones jack (phones)

Listening to the Sound



Standard operating procedures

1 power
Switch ON the power switch.

2 speakers
Select the main and/or remote speaker systems to be used.
Note:
When only one system of speakers is connected, no sound will be heard if both speaker selectors are pressed.

3 monitor
Check to be sure the indicator is not illuminated.
If the indicator is illuminated, press this switch.
Note:
To listen to sound from the equipment connected to the "VCR 1/EQ" terminals, however, press this switch so that the indicator is illuminated.

4 input selector
Select the sound source.
VCR 2/TV: Press to listen to sound from equipment connected to the "VCR 2/TV" terminals.
tape: Press to listen to tapes.
CD: Press to listen to compact discs.
tuner: Press to listen to radio broadcasts.
phono: Press to listen to phono discs.
(The corresponding indicator will illuminate.)

5 **Begin operation of the system components to be used.**
Refer to the operating instructions of each component.

6 volume
Adjust the volume level.

When listening through headphones

- Reduce the volume level before connecting headphones.
- If sound from speakers is not wanted, set the speaker selectors to the "off" position.
- Avoid listening for a long time at a volume level so high that it irritates the ears.

While listening to music

super bass
Press this button if the ultra-low frequencies seem weak.
(The indicator will illuminate.)

balance
Adjust the balance for the left/right volume.

treble
Adjust the high-frequency sound to the desired tone quality.

bass
Adjust the low-frequency sound to the desired tone quality.

When using the graphic equalizer

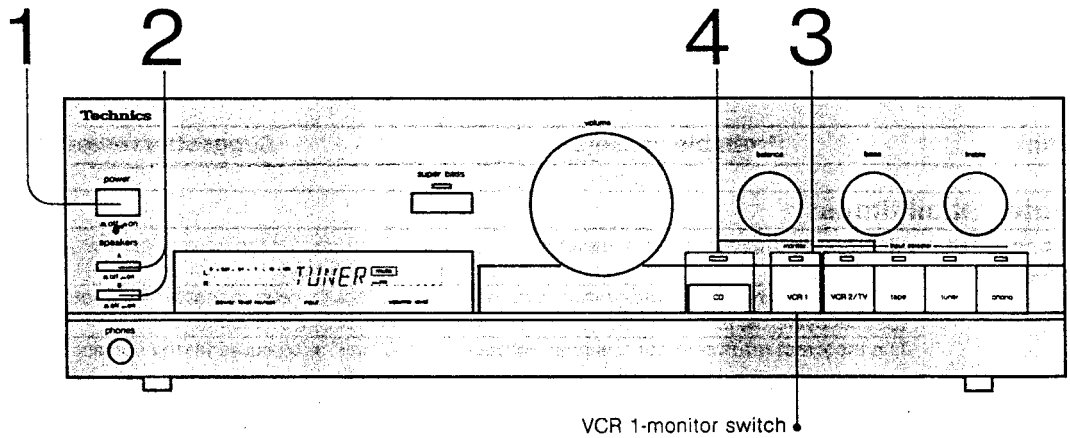
Various effects produced by the graphic equalizer can be applied to reproduced sound if the graphic equalizer is connected to the "VCR 1/EQ" terminals on the rear panel.

1. **Press the VCR 1-monitor switch.**
   (The indicator will illuminate.)
2. **Adjust tone quality as desired on the graphic equalizer.**
   (Refer to the operating instructions of the graphic equalizer for details.)

After listening is finished

Use the volume control to reduce the volume level and switch OFF the power of each unit.

Recording



1 power
Switch ON the power switch.

2 speakers
Select the main and/or remote speaker systems to be used.
Note:
When only one system of speakers is connected, no sound will be heard if both speaker selectors are pressed.

3 monitor
Check to be sure the indicator is not illuminated.
If the indicator is illuminated, press this switch.

4 input selector
Select the program source to be recorded.
(The corresponding indicator will illuminate.)

5 **Begin the operation of the sound source to be recorded.**
Refer to the operating instructions of each component.

6 **Adjust the recording level by using the controls on the tape deck.**
Then begin recording.
Refer to the operating instructions of the tape deck.

Note:
Do not switch to another sound source during recording, because to do so will cause the recorded sound to be interrupted.

To record while using the graphic equalizer

Varions effects produced by the graphic equalizer can be applied to sound being recorded if the graphic equalizer is connected to the "VCR 1/EQ" terminals on the rear panel.

1. **Press the VCR 1-monitor switch.**
   (The indicator will illuminate.)
2. **Refer to the operating instructions of the equalizer used for details and proper switch settings.**

About the Direct-Operation Function

During remote-control operation, this unit's input selector setting will change automatically [corresponding to the function selected by the remote-control transmitter (not included)].

(See the operating instructions of the component with which the remote-control unit is included for details about the functions available on the remote-control transmitter.)

Troubleshooting Guide

Before requesting service for this unit, check the chart below for a possible cause of the problem you are experiencing. Some simple checks or a minor adjustment on your part may eliminate the problem and restore proper operation.
If you are in doubt about some of the check points, or if the remedies indicated in the chart do not solve the problem, refer to the directory of Authorized service centers (enclosed with this unit) to locate a convenient service center, or consult your Technics dealer for instructions.

Problem	Probable cause(s)	Suggested remedy
Problems noted at all times		
No sound is heard when the power is switched on.	The power cord plug is not completely inserted.	• Confirm that the power cord plug is connected completely.
	Connections are incomplete or incorrect to the speaker systems, etc.	• Check to be sure that all connection wires are correctly connected.
	The incorrect input selector has been pressed.	• Check to be sure that the correct selector is pressed.
	The speaker selectors are incorrectly set to the "off" position.	• Set to the "on" position.
	The tape-monitor switch is incorrectly set so that the indicator illuminates.	• Set the tape-monitor switch so that the indicator does not illuminate.
When listening to stereo sound, the sound of the various musical instruments is not heard from its correct position.	The positive (+) and negative (−) connections of the speaker connection wires are reversed.	• Reconnect the speaker connection wires so that the positive and negative connections are correct.
When listening to stereo sound, the left and right sounds are reversed.	The left and right connections of the speaker connection wires are reversed.	• Check the speaker connection wires and connect them correctly if necessary.
	The left and right connections of the connection cables connected to other equipment are reversed.	• Check the connection cables to other equipment and connect them correctly if necessary.
Sound is not heard from the speaker system on one side.	The speaker connection wires are disconnected.	• Check and correct the connections of the speaker connection wires.
	The balance control of the amplifier is set too far to one side.	• Set so that sounds are heard at the center, between the speaker systems.

Maintenance

To clean this unit, use a soft, dry cloth.
If the surfaces are extremely dirty, use a soft cloth, dipped into a soap-and-water solution or a weak detergent solution.
Wring the cloth well before wiping the unit.
Wipe once again with a soft, dry cloth.
Never use alcohol, paint thinner, benzine, nor a chemically treated cloth to clean this unit.
Such chemicals may damage the finish of your unit.